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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-----------------|-------------|----------------------|---------------------|------------------|
|-----------------|-------------|----------------------|---------------------|------------------|

10/696,645

10/30/2003

Talbot Albert Chubb

7790

7590

09/16/2005

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EXAMINER

PALABRICA, RICARDO J

ART UNIT

PAPER NUMBER

3663

DATE MAILED: 09/16/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

|                              |                        |                      |  |
|------------------------------|------------------------|----------------------|--|
| <b>Office Action Summary</b> | <b>Application No.</b> | <b>Applicant(s)</b>  |  |
|                              | 10/696,645             | CHUBB, TALBOT ALBERT |  |
|                              | <b>Examiner</b>        | <b>Art Unit</b>      |  |
|                              | Rick Palabrica         | 3663                 |  |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 07 July 2005.
- 2a) ☒ This action is **FINAL**.                      2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) 5-20 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-4 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |   |   |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892)                        | 4) <input type="checkbox"/> Interview Summary (PTO-413)                     |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)    | Paper No(s)/Mail Date. _____  |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| Paper No(s)/Mail Date _____   | 6) <input type="checkbox"/> Other: _____                                    |

*HC*

### **DETAILED ACTION**

1. Applicant's 7/7/05 Amendment, which amends the specification and traverses the rejection of claims in the 5/10/05 Office action, is acknowledged.

2. The amendment filed on 7/7/05 is objected to under 35 U.S.C. 132(a) because it introduces new matter into the disclosure. 35 U.S.C. 132(a) states that no amendment shall introduce new matter into the disclosure of the invention. The added material, which is not supported by the original disclosure, is as follows: the amendment to the specification shown as underlined entries at pages 1-11.

Applicant is required to cancel the new matter in the reply to this Office Action.

3. Applicant traversed the rejection of claims under 35 U.S.C. 112, first and second paragraphs, and under 35 U.S.C. 101, by repeatedly citing Iwamura et al. as providing "reputable and factual evidence that supports the validity of the claimed process to produce reproducible, sustainable excess heat" (e.g., see items 2 and 8 of "Reconsideration of Claims" in the 7/7/05 Amendment). Applicant's arguments have been fully considered but found unconvincing.

As stated in Section 2 of the 5/10/05 Office action, several members of the scientific community, including Shanahan, have raised doubts regarding the nuclear process claimed by Iwamura et al. Examples of issues raised by Shanahan have been discussed in said Office action.

As to the issue of surface contamination, Applicant alleges that he "knows of no volatile Pr compounds that could be embedded in the deuterium gas (see item 9 of "Reconsideration of Claims"). Applicant's lack of knowledge on the matter is not dispositive of the issue. Also, Applicant's statement has no probative value because it represents his own opinion that is nothing more than a conclusory statement unsupported by objective factual evidence (see MPEP 716.01(c) and MPEP 2145).

As to the issue of eliminating contamination as a source, Applicant alleges that "the before start measurement of the surface composition precludes significant Pr surface contamination." Underlining provided. The Examiner disagrees because contamination can occur through out the entire process, e.g. leakage during operation, which would not be detected by the so-called "before start measurement".

As to the issue of detection of 0.01 ppm Pr, Applicant's response that essentially dismisses the matter as insignificant has no probative value because it is his own opinion that is not supported by objective evidence.

As stated in the previous Office action, these three issues are only examples of a number matters raised by Shanahan regarding Iwamura et al.'s process. Other issues that are cited in the Shanahan reference include the Iwamura results have not been proven to be replicable, the anomalous Mo isotope distribution in the SIMS mass spectrum, etc. Note that the issue of lack of reproducibility of the results is one of the key items cited by the Examiner in the previous Office action, as evidence that Applicant has not shown that he has arrived at an operative cold fusion system.

Art Unit: 3663

4. Applicant traversed the rejection of claims based on the cited prior art (i.e., Joshi, Sugaya, Joshi-McIntyre et al. combination, and Joshi-Idota et al. combination, on the ground that none of them teaches "the use of a metal plate reactor containing salt-metal interface volumes such as are present when the reactor contains one or more Iwamura-type diffusion-inhibiting layers." The Examiner disagrees. The above-cited features upon which the applicant relies are not recited in rejected claim. There is no recitation in any of the claims of either: a) the so-called "salt-metal interface volumes"; or b) "one or more Iwamura-type diffusion layers". Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993).

Additionally, if said unrecited features are considered by the applicant to be critical to his invention, then such omission would amount to a gap between the essential elements. In this case, the claim(s) would be incomplete and would be rejected under 35 U.S.C. 112, second paragraph. See MPEP § 2172.01.

5. The Examiner notes that the Applicant did not traverse the rejection of the claims under 35 U.S.C. 112, second paragraph, for failure to set forth steps in the claimed process.

### ***Specification***

6. The specification is objected to under 35 U.S.C. 112, first paragraph, as failing to provide an adequate written description of the invention and as failing to adequately

Art Unit: 3663

teach how to make and/or use the invention, i.e. failing to provide an enabling disclosure.

There reasons are the same as those stated in section 2 of the 5/10/05 Office action, as further clarified in section 3 above, in regard to the operativeness of the claimed method of producing exothermic nuclear reactions (as exemplified by the issues raised by Shanahan), the reproducibility of results, the need for undue amount of experimentation to enable an artisan to make and use the claimed method for its indicated purpose, etc.

#### ***Claim Rejections - 35 USC § 101***

35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

7. Claims 1-4 are rejected under 35 U.S.C. 101 because the claimed invention as disclosed is inoperative and therefore lacks utility.

The reasons are the same as those stated in section 3 of the 5/10/05 Office action, as further clarified in sections 3 and 6 above, which reasons are accordingly incorporated herein.

#### ***Claim Rejections - 35 USC § 112***

8. Claims 1-4 are rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to

Art Unit: 3663

make and/or use the invention. The reasons that the inventions as disclosed are not enabling are the same as the reasons set forth in section 6 above as to why the specification is objected to and the reasons set forth in section 6 above are accordingly incorporated herein.

9. Claims 1-4 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The claims do not set forth steps in the claimed inventive process for generating heat by exothermic reaction. See MPEP 2173.05(q), which states:

Attempts to claim a process without setting forth any steps involved in the process generally raises an issue of indefiniteness under 35 U.S.C. 112, second paragraph.

***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

10. Claim 1 is rejected under 35 U.S.C. 102(b) as being anticipated by either one of Joshi (WO 90/13127) or Sugaya et al.

The reasons are the same as those stated in section 6 of the 5/10/05 Office actions, as further clarified in section 4 above, which reasons are incorporated herein.

Art Unit: 3663

11. Claim 3 is rejected under 35 U.S.C. 102(b) as being anticipated by Joshi, who discloses a Pd cathode. See also section 4 above.

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

12. Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Joshi in view of McIntyre et al. (U.S. 4,279,709). Joshi discloses the Applicant's claim except for the use of CaO.

The reasons are the same as those stated in section 8 of the 5/10/05 Office actions, as further clarified in section 4 above, which reasons are incorporated herein.

13. Claim 4 is rejected under 35 U.S.C. 103(a) as being unpatentable over Joshi in view of Idota et al. (U.S. 6,235,427 B1). Joshi discloses the Applicant's claim except for the solid electrolyte of polyethylene oxide containing deuterided phosphoric acid.

The reasons are the same as those stated in section 9 of the 5/10/05 Office actions, as further clarified in section 4 above, which reasons are incorporated herein.



***Conclusion***

14. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

15. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Rick Palabrica whose telephone number is 571-272-6880. The examiner can normally be reached on 6:30-5:00, Mon-Thurs.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jack Keith can be reached on 571-272-6878. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 3663

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

RJP  
September 13, 2005

  
JACK KEITH  
PRIMARY EXAMINER  
SPE 3663